

not agree that the subject application is allowable, Applicants request that the next Office Action not be made final and that the following remarks be addressed.

The Claims

In one aspect of the invention, Claim 1 relates to an elevator system that includes an elevator assembly disposed within a hoistway and suspended by elevator ropes having ends suspended with respect to a pair of rigid structures. In another aspect, Claim 11 relates to a method of countering load reaction forces in a pair of rigid structures caused by a vertical load attributable to an elevator assembly suspended from said rigid structures. In other aspects, Claims 14 and 17 each relates to an elevator system including an elevator assembly disposed within a hoistway and a pair of load bearing structures from which the elevator assembly is suspended. In each of these aspects of the invention, the rigid or load bearing structures are affixed to opposing walls of/within the hoistway, and a compression member is positioned between the rigid or load bearing structures.

The Cited Art

On the other hand, Miller et al. relates to mounting a traction machine on a vertical beam 52 disposed in a hoistway. One dead-end hitch 38 is affixed to another such beam 64. Applicants find no indication in Miller et al. as to how or where the other dead-end hitch 44 is affixed.

Rodosta relates to a free-standing automobile lift consisting of four hollow, vertical corner posts, which are “rigidly-fixed” to a floor, and a vehicle-supporting frame slidably connected to the posts. According to the Office Action, transverse tie rods 18-20, which connect the top ends of the corner posts, are equated to the claimed compression member, and it is alleged that it would have been obvious to have provided such a compression member between the “rigid structures” of Miller et al. in order to prevent the rigid structure from bending due to vertical loading.

The Combination of Miller et al. in view of Rodosta

Applicants respectfully submit that the combination of Miller et al. in view of Rodosta is not proper. Further, even if combined, Applicants respectfully submit that the combination would not have included all of the features recited in the independent claims.

Propriety of the Combination.

Initially, Miller et al. does not disclose or suggest any concern whatsoever with non-vertical loading.

Additionally, Miller et al. discloses that the beams 52, 64 are structural stress, I-shaped structures that are readily available, relatively inexpensive and have well-known strength characteristics (column 3, lines 33-44). One purpose of functionally separating the mounting beams from the guide rails is to permit each to be optimized for their respective functions (column 1, lines 59-61). Thus, to whatever extent non-vertical loading might have been a consideration, there is no recognition of the possibility of bending due to non-vertical loads (asserted in the rejection as the motivation for the combination), and the foregoing passages would seem to refute such a concern. There is no objective reason to believe that any non-vertical loads on the beams would not be readily borne by the beams themselves.

Further, the beams of Miller et al. are disposed within a closed hoistway, and the rejection seems to be predicated on the affixation of the beams to the walls (which apparently would have been readily done by conventional means). There is no suggestion or objective reason to believe that any non-vertical loads on the beams that would not have been absorbed by the beams themselves, would not have been readily borne by the walls.

On the other hand, in the free-standing structure of Rodosta in which the corner posts are affixed to the floor, there are no surrounding vertical structures to which to affix the corner posts. Further, the horizontal forces at the tops of the corner posts would have been considerable, and the need for compression members apparent. Two of the cited tie

rods 18, 19 run parallel to lengths of load-bearing cables 47, 47, which extend horizontally between the top ends of respective pairs 12, 14 and 13, 15 of the corner posts, at which pulleys redirect the cables 47, 47 downward. No similar arrangement is shown in Miller et al. Also, the other cited tie rod 20 encases a shaft 21, to the ends of which two of the above-mentioned cable-redirecting pulleys 34, 35, located at corner posts 12, 13, respectively, are journaled. Again, no similar arrangement is shown in Miller et al.

Therefore, in contrast to Rodosta, there would have been no objective reason to believe a compression member would be needed in the arrangement of Miller et al., to prevent bending due to vertical loading or for any other reason. Certainly, no indication of such need can be found in Miller et al. And nothing in Rodosta would suggest that the tie rods be used in such a manner.

Therefore, there would have been no objective motivation to combine the cited documents as asserted.

Features of the Combination.

Even if combined, the documents fail to disclose salient features of the claimed invention.

As noted, no details regarding the affixation of the dead-end hitch 44 are discussed in Miller et al., and Rodosta discloses a free-standing structure. Thus, regarding Claim 1, both Miller et al. and Rodosta fail to disclose or suggest that the ends of the elevator ropes are suspended with respect to a pair of rigid structures that are affixed to opposing walls of the hoistway in the claimed manner.

Further, there is no disclosure in either cited document to suggest that, if combined, the compression member would be provided between points on said rigid structures from which said elevator assembly is suspended. Thus, the cited combination fails to disclose or suggest the features recited in Claim 11 regarding positioning the compression member between points on said rigid structures from which said elevator assembly is suspended.